AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

Listing of Claims:

Claims 1-14 (Canceled)

15. **(New)** A method for measuring the injection rate of an injection valve for liquids, preferably for liquid fuel, in which the injection valve (3) injects the liquid into a liquid-filled measurement volume (1), the measurement volume (1) being closed off on all sides and a pressure sensor (20) being located in the measurement volume (1), the method comprising the steps of:

injecting liquid by the injection valve (3) into the measurement volume (1);

measuring the pressure (p(t)) in the measurement volume (1) by means of the pressure sensor (20) during the injection, and recording of these measured values;

determining the speed of sound (c) in the measurement volume (1); and

determining the injected test liquid quantity (m(t); Δm) from the measured pressure values (p(t)) and the speed of sound (c).

16. **(New)** The method according to claim 15, wherein the measured pressure values (p(t)) are recorded by an electronic computer (28) during the injection.

17. **(New)** The method according to claim 15, wherein the speed of sound (c) is determined by means of a separate measurement method.

18. **(New)** The method according to claim 17, wherein the speed of sound is calculated from the transit time of a sound signal traveling from a sound transducer (21) to a sound receiver (20; 30).

19. **(New)** The method according to claim 15, wherein the speed of sound (c) is determined from the natural frequencies (ν_n) of the measurement volume (1).

20. **(New)** The method according to claim 19, wherein the natural frequencies (ν_n) are determined by a frequency analysis of the measured pressure values (p(t)).

21. **(New)** The method according to claim 20, wherein the measured pressure values (p(t)) are filtered with a low-pass filter.

22. **(New)** The method according to claim 21, wherein from the course of the measured pressure values (p(t)), a variable proportional to the injection rate (r(t)) is calculated by chronological differentiation.

23. **(New)** An apparatus for measuring the injection rate (r(t)) of an injection valve (3) for liquids, the apparatus comprising

a measurement volume (1) which is closed off by walls on all sides and is filled with a test liquid,

an opening (10) in the wall (2) of the measurement volume (1) for receiving an injection valve (3), so that the injection valve (3) in the installed position protrudes with at least one injection opening (12) into the measurement volume (1), and

a pressure sensor (20) which is located in the measurement volume (1), the pressure sensor (20) being disposed in the pressure node of the first natural pressure oscillation of the measurement volume (1).

24. **(New)** The apparatus according to claim 23, wherein the measurement volume (1) is embodied cylindrically.

25. **(New)** The apparatus according to claim 24, wherein the pressure sensor (20) is located in the radial plane that is located centrally between the two bases (102; 202) of the cylinder.

26. **(New)** The apparatus according to claim 23, further comprising an electronic computer (28) which detects the measured values of the pressure sensor (20) and stores them in memory.

27. **(New)** The apparatus according to claim 26, further comprising a program that calculates the natural frequencies of the measurement volume (V) from the recorded measured pressure values (p(t)) runs on the electronic computer (28).

28. **(New)** The apparatus according to claim 23, further comprising a sound transducer (21) and a separate sound receiver (30) are located in the measurement volume (V).